

*ALLTEL Corporation · American Tower Corporation · AT&T Wireless Services,
Inc. · Cellular Telecommunications & Internet Association · Cingular Wireless ·
Crown Castle USA · PCIA, The Wireless Infrastructure Association ·
Nextel Communications · SBA Network Services, Inc. · SpectraSite Communications,
Inc. · Sprint Corporation · T-Mobile USA, Inc. · United States Cellular Corporation ·
Verizon Wireless · Western Wireless Corporation*

December 23, 2003

Via Overnight Mail

The Honorable Marion C. Blakey
Federal Aviation Administration
800 Independence Avenue, S.W.
Washington, DC 20591

Re: **FAA Electromagnetic Interference Coordination**

Dear Administrator Blakey:

On behalf of the Colo Void Clause Coalition (“CVCC”)¹, I am writing to inform you that effective January 9, 2004, the undersigned companies will adopt unilaterally the Voluntary Best Practices Agreement Regarding the Potential for Electromagnetic Interference Upon FAA Facilities (“Best Practices Agreement”), a copy of which is attached hereto as Exhibit A.

In discussions over the last year, Federal Aviation Administration (“FAA”) staff and the undersigned companies and trade associations have agreed that changes can be made to the FAA’s electromagnetic interference (“EMI”) obstruction evaluation and notification procedures in certain frequency bands without adversely affecting air safety, while reducing significant administrative burdens on the FAA and industry. In fact, FAA staff developed a “Proposed Memorandum of Understanding” (“Proposed MOU”) between the FAA and Federal Communications Commission (“FCC”) to eliminate specifically identified EMI filings. Unfortunately, the Proposed MOU was not implemented, and alternate resolution efforts have stalled, leaving the pressing problems caused by the current process to continue unabated.

¹ The CVCC is a coalition of wireless carriers, tower companies and trade associations that together currently own or manage the majority of the almost one hundred thousand radio towers throughout the United States. The CVCC was formed in response to the increasing burden, uncertainty and delay posed by the FAA’s apparent policy interpretation regarding EMI and communications tower collocations.

As you may be aware, the wireless industry has sought to streamline and clarify the FAA's EMI obstruction evaluation process and notification procedures since March 2000.² Not only does the current process delay the deployment of critical wireless facilities and services, it also unnecessarily places a significant burden on FAA, FCC and industry resources. Compounding these problems is the regulatory uncertainty that the process engenders, leading to inconsistent interpretations and notification practices throughout the industry.

In a letter dated October 1, 2002, the CVCC alerted the FAA to the acute and immediate need to resolve this issue.³ FAA staff responded quickly and met with CVCC representatives at FAA Headquarters in Washington, D.C. on January 16, 2003. At that time, there appeared to be a consensus that the FAA's current EMI policy, as applied to collocations, utilizes FAA and industry resources inefficiently. There was also agreement amongst technical experts in attendance that the bulk of CVCC member operations do not interfere with FAA facilities.

With the recognition that modifications in several frequency bands have minimal EMI effects on FAA facilities, FAA staff submitted a Proposed MOU to the FCC in May 2003 that envisioned the grant of waivers of "frequency only" notice requirements for collocations involving equipment in several frequency bands, including, among others, the PCS, cellular, digital SMR and 900 MHz paging frequencies. However, the FCC declined to enter into the proposed agreement, citing jurisdictional issues.

The CVCC subsequently contacted FAA staff, urging consideration of alternative approaches to resolving the EMI notification problem, including a voluntary "best practices" agreement between industry and the FAA that would put into effect the terms of the FAA's Proposed MOU. Unfortunately, the request was not acted upon, and the problems resulting from current EMI notification procedures continue.

Accordingly, the CVCC member companies have determined that they must act now to standardize and streamline EMI notification procedures. Their respective trade associations will also encourage all members to take similar actions. As of January 9, 2004, consistent with the aforementioned Best Practices Agreement, the undersigned companies will plan to file only frequency notifications for facilities *not* excluded under the Best Practices Agreement.

The procedures outlined in the Best Practices Agreement largely track those set forth in the FAA's Proposed MOU sent to the FCC in May 2003, providing certainty and guidance as to what

² See Letter from Sheldon R. Moss, Director, Government Relations for Wireless Infrastructure, Personal Communications Industry Association to Jane F. Garvey, Administrator, Federal Aviation Administration, March 14, 2000, attached hereto as Exhibit B.

³ See Letter from CVCC Member Companies and Associations to Marion C. Blakey, Administrator, Federal Aviation Administration, October 1, 2002, attached hereto as Exhibit C.

types of EMI reporting activity is relevant to the safety of the nation's airspace. Specifically, the Best Practices Agreement provides for waivers of "frequency-only" notification requirements for antenna systems transmitting in certain designated frequency bands, provided that the subject antenna systems:

- will not violate any other obstruction criteria set forth in 14 C.F.R. Part 77, other than EMI;
- will not be located on Federal or Public Use Landing Facilities property; and
- will be located beyond a 1.0-nautical mile radius from published FAA facilities.


The Best Practices Agreement further provides that licensees of antenna systems causing EMI to FAA facilities operating in the designated frequency bands must correct any harmful interference immediately. And, as explained in the CVCC's October 1, 2002 letter, the clarifications contained in the Best Practices Agreement will not endanger the American public, as legitimate EMI concerns will still be fully addressed.

The CVCC again respectfully submits that the Colo Void Clause places an unnecessary and substantial burden on tower owners, the wireless industry and the FAA, without concomitant public benefit in safety to the nation's airspace. Indeed, the FAA has put forth a proposal that recognizes that (to the extent it exists at all) the risk of interference in certain frequency bands is minimal. Under the Best Practices Agreement, EMI Notices will be handled in a much more efficient manner, thereby alleviating the undue burden on government and industry resources and accelerating the deployment of critical wireless infrastructure and services, while at the same time ensuring that lawful FAA regulations and policies are followed in uniform fashion. For these reasons, the CVCC strongly believes the public interest will be served by the expeditious adoption of the attached Best Practices Agreement and will, therefore, implement the terms of the Agreement on January 9, 2004.

The CVCC remains committed to working with the FAA to promote air safety and address any concerns arising from the actions described herein. We invite you to contact the CVCC spokesperson, Jay Keithley at 703.739.0300 with any questions or concerns.

The Honorable Marion C. Blakey, Administrator
Federal Aviation Administration
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Respectfully submitted,


Jay Keithley
Colo Void Clause Coalition

On behalf of:

/s/ Glenn S. Rabin
Glenn S. Rabin, Vice President – Federal
Communications Counsel
ALLTEL Corporation

/s/ Douglas I Brandon
Douglas I. Brandon, Vice President – External
Affairs
AT&T Wireless Services, Inc.

/s/ Kellye E. Abernathy
Kellye E. Abernathy, Executive Director –
Regulatory Compliance
Cingular Wireless

/s/ Robert H. McNamara
Robert H. McNamara, Senior Counsel –
Regulatory
Nextel Communications

/s/ Edward G. Roach
Edward G. Roach, Associate General Counsel –
Regulatory Compliance
SBA Network Services, Inc.

/s/ Luisa L. Lancetti
Luisa L. Lancetti, Vice President – Wireless
Regulatory Affairs
Sprint Corporation

/s/ James R. Jenkins
James R. Jenkins, Vice President, Legal and
External Affairs
United States Cellular Corporation.

/s/ William J. Hackett
William J. Hackett, Director – Regulatory
Compliance
Western Wireless Corporation

/s/ H. Anthony Lehv
H. Anthony Lehv, Vice President & Chief
Compliance Officer
American Tower Corporation

/s/ Michael F. Altschul
Michael F. Altschul, Senior Vice President &
General Counsel
Cellular Telecommunications & Internet Ass'n

/s/ Monica Gambino
Monica Gambino, Associate General Counsel,
Regulatory Affairs
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/s/ Jay Kitchen
Jay Kitchen, President & CEO
PCIA, The Wireless Infrastructure Association

/s/ Brian Dietrich
Brian Dietrich, Vice President – Property
Management
SpectraSite Communications, Inc.

/s/ Thomas Sugrue
Thomas Sugrue, Vice President – Government
Affairs
T-Mobile USA, Inc.

/s/ Andre J. Lachance
Andre J. Lachance, Regulatory Counsel
Verizon Wireless

The Honorable Marion C. Blakey, Administrator
Federal Aviation Administration
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cc:

David Mandell, Chief of Staff, FAA
Read Van de Water, Ass't Secretary for Aviation and International Affairs, DOT
Jeffrey N. Shane, Under Secretary for Policy, DOT
Steven B. Zaidman, Director of Airway Facilities, FAA
George Sakai, Office of Spectrum Policy & Management, FAA
Bryan Tramont, Chief of Staff to Chairman Michael K. Powell, FCC
Jennifer Manner, Senior Counsel to Commissioner Kathleen Q. Abernathy, FCC
Paul Margie, Legal Advisor to Commissioner Michael J. Copps, FCC
Sam Feder, Legal Advisor to Commissioner Kevin J. Martin, FCC
Barry Ohlson, Legal Advisor to Commissioner Jonathan Adelstein, FCC
John Muleta, Bureau Chief, Wireless Telecommunications Bureau, FCC
Roger Noel, Division Chief, Mobility Division, FCC

EXHIBIT A

**VOLUNTARY BEST PRACTICES AGREEMENT
REGARDING THE POTENTIAL FOR ELECTROMAGNETIC
INTERFERENCE UPON FAA FACILITIES**

I. INTRODUCTION

1. This Best Practices Agreement (“Agreement”) represents a commitment between the undersigned companies that comprise the Cob Void Clause Coalition (“CVCC”) with regard to the potential for electromagnetic interference (“EMI”) caused to FAA communications, radio-navigation, and/or surveillance facilities with respect to the mounting locations of FCC regulated transmitters for certain wireless services authorized pursuant to C.F.R. 47 C.F.R. Parts 1 (Practice and Procedure), 22 (Public Mobile Services), 24 (Personal Communications Services), 90 (Private Land Mobile Radio Services), and 101 (Fixed Microwave Services).

II. BACKGROUND

2. In October 2002 and early 2003, the FAA evaluated contributions from various private industry sources, including the Personal Communications Industry Association (PCIA) and the Cellular Telecommunications Internet Association (CTIA), regarding the FAA’s EMI evaluation process and procedures under C.F.R. 14 Part 77 and FAA Order 7400.2¹. In particular, industry sources voiced concerns regarding “frequency-only” notice requirements and proposed that the FAA grant waivers for a number of frequency bands.
3. Research from prior case studies and engineering evaluations show minimal EMI effects on FAA facilities from several frequency bands. Therefore, the undersigned companies voluntarily enter into the following Best Practices Agreement as specified below.

III. AGREEMENT

4. Under this Agreement, the undersigned companies will not provide notice for a transmitter/antenna mounting location (“antenna system”), whereas,
 - a. The antenna system will not violate any other obstruction criteria, other than EMI, as stated under C.F.R. 14 Part 77,

and whereas,
 - b. The antenna system will not be located on Federal or Public Use Landing Facilities property,

and whereas,

¹ FAA Order 7400.2 § 6-10

- c. The antenna system will be located beyond a 1.0-nautical mile radius from published FAA facilities,

and whereas,

- d. The antenna system will transmit a frequency in the following bands:

	<i>Frequency Band</i>	<i>CFR 47 Part</i>	<i>Current Service Type</i>
i.	806-821/851-866 MHz	90	Industrial/Business/Specialized Mobile Radio Pool
ii.	821-824/866-869 MHz	90	Public Safety Mobile Radio Pool
iii.	816-820/861-865 MHz	1, 22	Basic Exchange Telephone Radio
iv.	824-849 MHz	1, 22	Cellular Radiotelephone
v.	869-894 MHz	1, 22	Cellular Radiotelephone
vi.	849-851/894-896 MHz	1, 22	Air-Ground Radiotelephone
vii.	896-901 MHz	90	900 MHz SMR
viii.	901-902 MHz	24	Narrowband PCS
ix.	929-930 MHz	1, 22, 90	Paging
x.	931-932 MHz	1, 22, 90	Paging
xi.	930-931 MHz	24	Narrowband PCS
xii.	935-940 MHz	90	900 MHz SMR
xiii.	940-941 MHz	24	Narrowband PCS
xiv.	1850-1990 MHz	24, 101	Broadband PCS / Point-to-Point Microwave
xv.	2305-2320 MHz	27	Wireless Communications (WCS)
xvi.	2320-2345 MHz	25	Satellite Digital Audio Radio Service (SDARS)
xvii.	2345-2360 MHz	27	Wireless Communications (WCS)

5. Furthermore, based on the understanding that FAA facilities provide services to ensure safety in the National Airspace System, the undersigned companies agree that the licensee of any antenna system causing EMI to FAA facilities operating in the aforementioned frequency bands must mitigate in a timely manner. Depending on the severity of the interference, licensees must eliminate harmful interference by employing extra filtering, reducing effective radiated power, or totally shutting down the system, as required by FCC rules.
6. This Agreement does not affect the requirement for notification to the FAA regarding the construction or modification of man-made structures under existing FAA and FCC Rules. Physical structures located on or near public use landing facilities raise concerns about possible obstruction to aircraft and will be handled under existing procedures.

IV. CONCLUSION

7. This Agreement should facilitate concerns voiced by private companies to expedite the time frame for build-out and deployment providing wireless services in these frequency bands. The companies subject to this agreement believe that the potential for EMI to FAA facilities from such antenna systems operating in those bands, specified herein, can be adequately handled in the manner set forth in this Agreement.

Point of Contact

Mr. Jay Keithley
Director of Government Relations
PCIA, The Wireless Infrastructure Association
500 Montgomery Street, Suite 700
Alexandria, VA 22314
703.739.0300

EXHIBIT B

COPY

March 14, 2000

Hand Delivered



Personal
Communications
Industry
Association

Jane F. Garvey
Administrator
Federal Aviation Administration
800 Independence Avenue, S.W.
Washington, DC 20591

Re: **Request for Clarification
Objects Affecting Navigable Airspace**

Dear Ms. Garvey:

With this letter, the Personal Communications Industry Association ("PCIA") asks the Federal Aviation Administration ("FAA") to clarify a critical portion of its policy regarding the obstruction evaluation process for objects affecting navigable airspace. PCIA believes that a timely resolution of the questions raised in this letter will help avert a potential crisis for both the FAA and the wireless communications industry. PCIA suggests that, absent the requested clarification from the FAA, such a situation may arise as a result of an exponential increase in the number of notifications that FAA regional offices would be required to process.

Specifically, PCIA seeks FAA clarification of whether a proposed change in frequency or transmitting power of an antenna on an existing structure (such as a tower) with a No Hazard determination requires the submission of a Notice of Proposed Construction or Alteration (FAA Form 7460-1). Current FAA actions taken in connection with individual requests for No Hazard determinations suggest that the FAA's policy effectively requires that notifications be submitted with the collocation of each additional antenna on an existing tower, and with any change of frequency and power for each existing antenna. PCIA suggests that this policy will result in the filing and FAA review of an endless flood of FAA Forms 7460-1 – significantly more than the limited circumstances identified in the regulations require. This letter describes PCIA's understanding of FAA's notification requirements and explains how an inconsistent application of these requirements could place an unnecessary and substantial burden on both tower owners and the FAA.

Letter to Jane Garvey

March 14, 2000

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A. Introduction and Background

PCIA is a trade association representing major segments of the wireless communications industry. PCIA members include companies that provide PCS, paging and wireless messaging, as well as commercial and private dispatch services. PCIA, through its Site Owners and Managers Alliance ("SOMA"), also represents companies that manage and develop communication towers and antenna facilities for all types of wireless and broadcast services. These site management companies specialize in the construction and operation of multiple tenant facilities, where a single site or tower accommodates the needs of many providers of wireless communication and broadcasting services. SOMA and its member companies are strong proponents of collocation as the single most effective strategy for reducing the number of antenna structures that will be needed to provide Americans with all types of communications services.

SOMA members currently own or manage approximately 50,000 towers throughout the United States and would be greatly affected by any FAA policy that would substantially increase the number of Notice of Proposed Construction or Alteration ("Notice or Notification") filings that would need to be filed with the FAA. A requirement to make Notice filings for each proposed frequency or transmitting power creates an extreme regulatory burden that is exacerbated by the apparently conflicting policies applied by different FAA regions and the resulting need to ascertain on a region-by-region basis what policies are to be applied. PCIA believes that the public interest would be well served by an expedited clarification of the FAA's notification requirements.

B. The Issue Requiring Clarification

1. The Law

Section 77.13 of the FAA's rules and regulations, 14 C.F.R. §77.13, requires notification to the FAA Administrator of certain types of construction or alteration. Specifically, the rule requires notification of construction or alteration that exceeds certain elevations (§77.13(a)(1)-(3)); that would be in an instrument approach area (§77.13(a)(4)); or that would be on certain airports (§77.13(a)(5)). The rule does not require notification where the only modification to an existing structure (that has already received a No Hazard determination) is the addition of a side mounted antenna and/or a change in frequency or output power of an antenna already on that tower.

2. Implied Policy

Notwithstanding the lack of any such requirement in its rules, many FAA regional offices have for some time been conditioning at least some of their No Hazard determinations as follows:

Letter to Jane Garvey

March 14, 2000

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This determination is based, in part, on the foregoing description which includes specific coordinates, heights, frequency(ies) and power. *Any changes in coordinates, heights, frequency(ies) or use of greater power will void this determination. Any future construction or alteration, including increase in heights, power, or the addition of other transmitters, requires separate notice to the FAA.* (Emphasis added)

In addition, Item #3 on the recently revised Form 7460-1 requests that Notice be provided of an "Alteration," defined in the Form's Instructions as "a change to an existing structure such as the addition of a side mounted antenna, a change to the marking and lighting, a change to power and/or frequency, or a change to the height."

3. The Administrative Burden

The conditional language cited above, along with the language in the revised Form 7460-1, suggests that there may now be a policy at the FAA requiring the submission of a Notice every time a licensee on an approved tower modifies its operating power or transmit frequency or a new antenna is placed on the tower. Such a policy is not only inconsistent with the FAA's rules, it will unnecessarily impose substantial burdens on both tower owners and the FAA. Modifications to output power and transmit frequency are made on a routine, sometimes weekly, basis by providers and operators of many types of wireless services, including cellular, personal communications service (PCS), paging, multichannel multipoint distribution service (MMDS), and public safety services such as police and emergency medical operations, etc.

For companies that own multiple thousands of towers nationwide,¹ an FAA requirement to submit a Notice each time a licensee on one of its towers adds or changes a frequency or increases its power could entail submitting hundreds of notifications to the FAA every single week. PCIA is concerned that such a deluge of paperwork would not only impair the tower owner's administrative resources, the resulting need to process this huge volume of paperwork

¹ There are several tower management companies and wireless service providers that each own and operate in excess of 1,000 communication and broadcast towers nationwide. Two of these companies each operate close to 10,000 towers and two others each operate over 5,000 towers. Additionally, a significant number of wireless service providers (such as cellular and PCS carriers) and tower management companies each own and operate hundreds of towers. Each of these towers in turn typically house multiple transmitters. Most communications towers subject to FAA Notification provide a platform for multiple communications service providers and operators. Some towers have fifty or more wireless systems transmitting radio signals.

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would overwhelm the FAA as well.²

To avert a potential crisis, PCIA respectfully asks the FAA to examine the full ramifications of the de facto rule change discussed in this letter. PCIA members, both wireless service providers and tower owners, wish to comply with all FAA requirements; however, just as plainly, they do not wish to undertake additional paperwork that the FAA does not require or desire. Prompt clarification of this issue by the FAA will resolve the uncertainty caused by potentially unnecessary and inconsistent compliance requirements. Further, both tower owners and FCC licensees would use this clarification to develop uniform policies for Notification that assure compliance with all FAA requirements and policies.

4. Implementation

If the FAA determines that frequency and power reporting requirement must be imposed, it could help those it regulates and itself as well by identifying a level of reporting that is useful and practical. In the past, an FCC licensee typically requested FAA approval for one facility, at one frequency, to be located on a tower structure. Today however, most FCC licensees no longer own, operate, or control the towers where their antennas and transmitters are located. Instead, an important new industry of specialized tower management companies operates a majority of communications towers, where the antenna facilities of multiple FCC licensees are collocated on one tower. Due to the dramatic increase in collocation, there are usually a number of different wireless communications services, encompassing a wide range and variety of frequencies and power levels, located on a typical tower.

In addition, ownership and control of a tower or a structure is usually separate from the

² This letter is not the vehicle to discuss the relative merits or detriments of such a policy. PCIA notes, however, that, based on informal conversation with FAA staff, the FAA's primary concern is electromagnetic interference (EMI) to FAA radio facilities caused by FM broadcast antennas. PCIA further notes that there is a factual basis for a bifurcated FAA policy that would place greater notification obligations for modifications to FM broadcast antennas than on other types of antennas where the risk of EMI is not as great. This type of bifurcated approach was reflected in an agreement between the FCC and FAA in 1991 on EMI procedures for non-FM broadcast transmitters. The FAA and FCC "agreed that the FAA will not issue a hazard determination to those applicants for licenses involving cellular fixed transmitters, fixed microwave transmitters, or AM broadcast transmitters that invite potential EMI, nor will the FAA request the applicants to use filtering beyond what is normally required by FCC rules." *"The FAA and FCC Agree to Simplify Procedures for Certain EMI Cases"* FCC Public Notice, released April 16, 1991, Mimeo 12662 (copy attached hereto). A 1996 PCIA request that this agreement be extended to cover personal communications service ("PCS") frequencies above 1855 MHz, paging frequencies at 900 MHz, and SMR frequencies at 800 and 900 MHz remains pending.

Letter to Jane Garvey
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FCC licensee's operation of the radio equipment. This separation affects the reporting process for frequencies and power levels.³ One commonly-used approach by tower management companies to account for future modifications of power and frequency is to attach to each initial Notice of Proposed Construction or Alteration a list of the power levels and frequencies that are likely be located on the tower in the future. This is done to ensure that the FAA is informed of possible frequency uses on a tower while avoiding the need to submit a separate Notice every time a modification to a frequency or a power level is made. As part of any clarification issued in response to this letter, PCIA requests that FAA address the use of this procedure. PCIA would also welcome suggestions from the FAA that could lead to less burdensome methods of compliance.

C. FAR 77 "Rewrite" NPRM

A Notice of Proposed Rulemaking ("NPRM"); Docket No. 2605,⁴ addressing the issue in question has been pending for almost ten years. In this NPRM, the FAA proposes to incorporate the Notice requirement in Federal Aviation Regulations ("FAR") Part 77 to include construction or alterations that might produce EMI. While conclusion of this proceeding may provide the clarification and certainty desired by PCIA, the proceeding has been pending for almost ten years, and FAA staff has given no indication that a decision is imminent.⁵ Pending conclusion of the rulemaking proceeding, clarification of the FAA's EMI notification policy is necessary. It would be an unfortunate waste of significant resources for both the communication industry and the FAA if a resolution to the Notification issues discussed in this letter is held hostage by a proceeding that shows no signs of completion.

³ Another consideration is that the FCC licensees make changes to the operating power and frequency of their antennas and equipment, not the tower owner. While a tower owner may contractually require a licensee to provide it with advance notification of any proposed changes, the licensee in fact controls modifications. As a result, the filing of such a notification in advance of the change's occurrence depends on the cooperation of the licensees.

⁴ *Objects Affecting Navigable Airspace*, Docket No. 26305, Notice No. 90-18, 55 FR 31722 (issued August 3, 1990).

⁵ PCIA notes that it intends to file in the near future a petition to reopen the record in the FAR Part 77 proceeding due to the staleness of the existing record.

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D. Conclusion

In conclusion, PCIA requests clarification of the frequency and power Notice issues so that FCC licensees and the tower industry can develop and implement internal policies consistent with the FAA's policies. The public interest will be served by expeditious clarification of these issues. Such clarification would alleviate undue burdens on both tower owners and the FAA, and would ensure that FAA regulations and policies are properly followed.

We would be pleased to meet with you in person to discuss these issues further.

Sincerely,



Sheldon R. Moss
Director, Government Relations
for Wireless Infrastructure

enclosure: FCC Public Notice: The FAA and FCC Agree to Simplify Procedures for Certain
EMI Cases (April 16, 1991)

cc: Reginald C. Matthews, FAA
Jamison Prime, FCC
Bertram F. Weintraub, FCC
James Voigt, FCC



Federal Communications Commission

Audio Services Division — Mass Media Bureau

ASD Decision Document

Public Notice

Released April 16, 1991 -- Mimeo No. 12662

The FAA and FCC Agree to Simplify Procedures for Certain EMI Cases

The Federal Aviation Administration (FAA) and Federal Communications Commission (FCC) have reached an agreement to simplify the handling of electromagnetic interference (EMI) issues with respect to AM broadcast stations, fixed microwave transmitters, and cellular radiotelephone fixed transmitters. The FAA's concern in this area results from the possibility that such transmitters might be installed too close to remotely controlled aeronautical receivers so as to disrupt air traffic control communications and navigational aids.

It has been agreed that the FAA will not issue a hazard determination to those applicants for licenses involving cellular fixed transmitters, fixed microwave transmitters, or AM broadcast transmitters that invite potential EMI, nor will the FAA request the applicants to use filtering beyond what is normally required by FCC rules. Rather, the FAA will include the following language in a Determination of No Hazard, assuming that physical obstruction is not an issue:

FAA facilities critical to aviation safety are located (distance) from your proposed transmitter site. You may cause harmful interference to these facilities if your equipment meets only minimal FCC standards for spurious emissions. Before you begin any transmission from your facility, contact (name and phone number of local FAA contact) to arrange procedures to verify that no interference is caused.

FCC requirements in:

- 47 C.F.R. 73.44(c) (in the case of AM broadcast stations)
- 47 C.F.R. 22.107(c) (in the case of fixed cellular transmitters)
- 47 C.F.R. 21.107(b) (in the case of common carrier fixed microwave transmitters)
- 47 C.F.R. 23(a) (in the case of common carrier fixed microwave transmitters)
- 47 C.F.R. 94.71(d) (in the case of operational fixed service transmitters)

indicate that the licensees may need to employ extra filtering or take other measures if their transmissions disrupt other services. The Commission requires its licensees to cooperate fully with users in other services, in this case the FAA, to eliminate any harmful interference covered by the above requirements.

This agreement does not affect the requirement of an FCC applicant to notify the FAA of proposed construction or modification of towers under existing FAA and FCC Rules. Facilities located near airports raise concerns about possible interference to aircraft and will be handled under existing

procedures.

This agreement should speed the authorization of service for licensees in the above categories. Both agencies agree that this special case of potential interference to ground based receivers from transmitters at widely differing frequencies can be adequately handled by requiring the licensee (applicant) to take whatever steps are necessary to correct any EMI effects immediately.

For further information about this topic, contact: FCC - Michael Marcus [Office of Engineering and Technology] at (202)-418-2470 or FAA at 267-9710.

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<http://www.fcc.gov/mmb/asd/decdoc/letter/1991-04-16-pubnot.html>

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Electromagnetic Interference (EMI) to FAA Installations

Engineering -- Legal -- Commission -- Combined Subject List

Audio Services Division -- Mass Media Bureau -- Federal Communications Commission

Updated February 20, 1997



EXHIBIT C

ALLTEL Corporation • American Tower
AT&T Wireless Services, Inc.
Cellular Telecommunications & Internet Association
Cingular Wireless • Crown Castle USA
Personal Communications Industry Association
Nextel Communications • SBA Network Services, Inc.
Sprint Corporation • T-Mobile USA, Inc.
Verizon Wireless • Western Wireless Corporation

October 1, 2002

Via Overnight Mail

The Honorable Marion C. Blakey, Administrator
Federal Aviation Administration
800 Independence Avenue, S.W.
Washington, DC 20591

Re: **FAA Electromagnetic Interference Coordination Requirements**

Dear Administrator Blakey:

The undersigned companies and trade associations (hereinafter the “Colo Void Clause Coalition” or “CVCC”), representing the nation’s largest wireless carriers and tower owners hereby request that the Federal Aviation Administration (“FAA”) consider the legal validity of – and policy rationale for – its current electromagnetic interference (“EMI”) obstruction evaluation process. The CVCC respectfully submits that the FAA’s process has resulted not only in a flood of unnecessary filings with the FAA and the Federal Communications Commission (“FCC”), but has also engendered inconsistent interpretations and practices throughout the wireless industry. Limited FAA resources should not be diverted towards unnecessary filings, especially at this time. Accordingly, there is an acute and immediate need for the FAA to clarify and standardize EMI notification procedures throughout the United States.

More specifically, the CVCC proposes that the FAA reinstitute its twelve year-old *Notice Of Proposed Rule Making* (“NPRM”) to promulgate clear and appropriate procedures in accordance with the FAA’s statutory authority for ensuring airspace safety.¹ In the interim, the CVCC further requests that the FAA clarify the scope of the EMI evaluation process and only require EMI filings in accordance with the proposals outlined in the 1990 *NPRM* as described more fully below. The CVCC also requests a meeting with your office to discuss this matter.

¹ *Objects Affecting Navigable Airspace*, Docket No. 26305, *Notice of Proposed Rule Making*, Notice No. 90-18, 55 FR 31722 (issued August 3, 1990) (“NPRM”).

A. Introduction and Background

The CVCC is a coalition of wireless carriers, tower companies and trade associations that has formed in response to the increasing burden, uncertainty and delay posed by the FAA's apparent policy interpretation regarding EMI and communications tower collocations.²

When tower companies, wireless service providers or tower owners construct new facilities for which FAA notification is necessary, FCC rules require an FAA determination of "No Hazard" before construction may commence. For some time now, FAA regional offices have been conditioning³ these No Hazard determinations as follows:

*This determination is based, in part, on the foregoing description which includes specific coordinates, heights, frequency(ies) and power. Any changes in coordinates, heights, frequency(ies) or use of greater power will void this determination. Any future construction or alteration, including increase in heights, power, or the addition of other transmitters, requires separate notice to the FAA. (Emphasis added)*⁴

The policy rationale for this so-called "Colo Void Clause" – which was adopted without any change in FAA rules or notice to industry – has never been articulated. Additionally, the CVCC parties do not believe that this overly broad policy addresses the issue of real FAA concern – interference to navigation and communication aid radio facilities. The vast majority of CVCC tower collocations are to permit the addition of cellular, Personal Communications Service ("PCS"), enhanced SMR, fixed microwave and satellite radio broadcast licensees to increase service coverage to the American public. The major concern of the FAA on EMI issues, as detailed in the 1990 *NPRM*, is potential interference from high-powered facilities, especially in the FM radio band.

Therefore, the current FAA policy causes the filing of EMI information for modifications that do not adversely affect FAA operations but nonetheless overwhelm the important cases that may merit FAA oversight. Moreover, and as the FAA has been advised previously, the legal

² Together, CVCC members currently own or manage the majority of the almost 100,000 radio towers throughout the United States. Collocation is defined herein as the mounting or installation of an antenna on an existing structure for the purpose of transmitting and/or receiving radio frequency signals for communications purposes.

³ This condition is commonly referred to within industry as the "Colo Void Clause."

⁴ In addition, Item #3 on the current FAA Form 7460-1 requests that Notice be provided of an "Alteration," defined in the Form's Instructions as "a change to an existing structure such as the addition of a side mounted antenna, a change to the marking and lighting, a change to power and/or frequency, or a change to the height." Furthermore, members of the CVCC have been consistently required to submit a new FAA Form 7460-1 for any change in power, frequency or addition of antenna to existing, approved structures by the regional offices.

validity of this condition is suspect.⁵ Finally, the condition imposes a substantial burden and cost upon the wireless industry without any concomitant benefit.

In fact, by suggesting that additional FAA approvals may be needed for the attachment of different antennas to an existing structure, the Colo Void Clause discourages collocation – which is the single most effective method for reducing the number of antenna structures across the United States and provides important public benefits.

The uncertain legal status of the Colo Void Clause has led to inconsistent treatment of this condition within industry. As a result, there are frequent conflicts amongst carriers and tower companies as to (1) when a notice must be filed, if at all; (2) whose responsibility it is to make a notice filing; and (3) what obligations there are, if any, to correct non-compliance. The regulatory uncertainty engendered by this condition serves neither industry nor the FAA.

The FAA Policies Concerning EMI Notification

1. *The Law*

Section 77.13 of the FAA's rules and regulations, 14 C.F.R. §77.13, requires notification to the FAA Administrator of certain types of construction or alteration. Specifically, the rule requires notification of construction or alteration that exceeds certain elevations (§77.13(a)(1)(3)); that would be in an instrument approach area (§77.13(a)(4)); or that would be on certain airports (§77.13(a)(5)). The rule does not require notification where the only modification to an existing structure (that has already received a No Hazard determination) is the addition of a side mounted antenna and/or a change in frequency or output power of an antenna already on that tower.

Clearly, the Colo Void Clause is neither addressed nor contemplated by existing FAA regulations. It appears that the Colo Void Clause was derived from the incomplete 1990 *NPRM*, in which the issue of EMI notifications was raised. As described more fully below, however, the 1990 *NPRM* proposals -- that were discussed but *never adopted*—are still more clear and less restrictive than the Colo Void Clause as currently interpreted by the FAA regional offices.

2. *FAA's 1990 NPRM Policy*

In the 1990 *NPRM*, the FAA sought comment on EMI notice criteria.⁶ Specifically, the FAA sought to adopt notice criteria that “would encompass construction or alteration of radio frequency transmitting stations whose antennae are located physically below airport imaginary surfaces and which have an operating frequency above 30 megahertz and *effective radiated*

⁵ See Letter from Sheldon R. Moss, Director, Government Relations for Wireless Infrastructure, Personal Communications Industry Association to Jane F. Garvey, Administrator, Federal Aviation Administration, of March 14, 2000. This letter is attached as Exhibit A of this filing.

⁶ See *NPRM*, 55 FR at 31724 (“Of particular significance are the proposals requiring that the FAA be given notice of electromagnetic construction or alterations...”).

*power above 10,000 watts.*⁷ In addition, the *NPRM* suggested notification of actions that would change the authorized frequency or effective radiated power of a transmitting station within 3000 feet of an air navigation or communication aid, construction of new FM or VHF-TV stations on existing antenna towers (side-mounting), and any alteration of existing FM and VHF-TV stations including height, frequency, and power.

Significantly, the FAA sought to address in a comprehensive manner the potential for EMI. The *NPRM* sought to "capture those proposed installations whose proposed heights would not penetrate physical obstruction standards, but whose location could likely present possible EMI problems . . . [and] to protect air navigation and communication aids from interference effects that may otherwise not need to be reported, notice would be required for other introductions of possible EMI activity."⁸ In contrast, the Colo Void Clause is only imposed where the applicant has filed a Form 7460-1 because the proposed construction or alteration exceeds the physical obstruction notice criteria. In effect, the Colo Void Clause does not achieve the *NPRM*'s goal of "protect[ing] air navigation and communication aids from interference effects that may otherwise not need to be reported."

Clearly, the 1990 proposals are much more defined and less restrictive than those currently imposed by the FAA regional offices. In contrast to the current FAA interpretation, the 1990 proposals would provide affected parties with more certainty and guidance as to what types of EMI reporting activity FAA considers relevant to the safety of the nation's airspace.

3. *Administrative Burden and Delay*

As noted above, the Colo Void Clause imposes a significant administrative burden on the FAA and the wireless industry without any concomitant public benefit. A strict literal application of the condition would suggest that a tower owner must seek FAA approval (*i.e.*, a new determination of No Hazard) *every time* a licensee on an already approved tower modifies its operating power, transmit frequency or a new antenna is placed on a tower.⁹ Modifications to output power and transmit frequency, for example, are made on a routine basis by providers and operators of many types of wireless services, including cellular, PCS, paging, multichannel multipoint distribution service (MMDS), and public safety services such as police and emergency medical operations.

For companies that own thousands of towers nationwide,¹⁰ a requirement to notify the FAA each time a licensee on one of its towers adds or changes a frequency or power could entail

⁷ *Id.* at 55 FR 31726 (emphasis added).

⁸ *Id.*

⁹ Again, industry participants currently interpret the condition in disparate ways.

¹⁰ There are several tower management companies and wireless service providers that each own and operate in excess of 1,000 communication and broadcast towers nationwide. Two of these companies each operate approximately 10,000 towers and two others each operate over 5,000 towers. Additionally, a significant number of wireless service providers (such as cellular and PCS carriers) and tower management companies each own and operate hundreds of towers. Each of these towers in turn typically house multiple transmitters. Most

the submission of hundreds of notifications to the FAA every week. Each of these FAA filings could necessitate additional submissions to the FCC and require additional notice to licensee tenants. This poses significant burdens on the FAA and wireless industry and creates delays that prevent or slow the deployment of wireless services.¹¹

This deluge of paperwork has inundated a number of the FAA regions, whose resources to review FAA Form 7460-1 Notices are already severely taxed. In some regions, action on Notices is taking longer than 90 days. With no immediate plans for increased staffing or automation, it is apparent that the current FAA procedures for handling EMI coordination must be streamlined and simplified in order to reduce the burden faced by both the FAA staff and the wireless industry. And, as explained above, the policy modifications proposed will not endanger the American public as legitimate EMI concerns will still be fully addressed.

4. *Suggested Revisions to FAA EMI Policies*

As noted, the CVCC believes that EMI policies must be standardized and tied to the policy goal of protecting the nation's airspace. At minimum, the FAA should immediately suspend its current policy for EMI notices until rules are adopted pursuant to a notice and comment rulemaking proceeding. If necessary, the FAA might also consider other, less burdensome methods for obtaining the same required information.

First, for the reasons outlined above, the FAA should revive immediately its twelve year old *NPRM* proposing changes to the EMI notification process.

Second, the CVCC would be supportive of efforts to privatize EMI coordination functions to the extent feasible. The CVCC understands that the FAA utilizes particular radiofrequency models and software to make determinations that specific uses of the electromagnetic spectrum near FAA operations do not cause harmful interference. Additionally, the CVCC believes that the first step in this coordination process is a location determination of the radiating source. Thus, if an altered structure is not within a prescribed distance from FAA navigation or communication aid systems, additional EMI calculations do not occur.

Therefore, the CVCC suggests that the FAA make public the locations of FAA navigation and communication aids. With this information, the CVCC and other affected parties will be in the position to determine whether the proposed antenna is within 3000 feet of the air navigational or communication aid and potentially eliminate filings for sites greater than this

communications towers subject to FAA notification provide a platform for multiple communications service providers and operators.

¹¹ Although the recent relaxation of this requirement to permit the filing of full frequency bands and a maximum power level has moderated the volume of filing requirements, for those structures that have not received this blanket treatment, many tower owners are filing an increasing volume of FAA Notices. See, e.g., *Letter to WirelessCo, L.P. d/b/a Sprint PCS* from Michael A. Baney, Acting Manager, Airspace Branch of the New England Region dated May 21, 2002 at page 2 (attached as Exhibit B). Moreover, it has been the experience of many CVCC members that requests for consideration of blanket frequencies take substantially longer than the already lengthy FAA approval process.

distance from FAA sites. Alternatively, affected parties could make these calculations and simply notify the FAA of the alterations after the fact, rather than awaiting FAA approval prior to making changes to existing structures.

Third, the CVCC recommends that the FAA also make available to the public its EMI software used to determine interference. Proponents could then use the software when a new antenna is proposed in the situations where FAA, in its 1990 *NPRM*, proposed that EMI evaluation may be necessary. These situations are: (1) where the antenna will be placed on a structure located within 3000 feet of an air navigation or communication aid; (2) where the antenna is used to broadcast FM-radio or VHF-TV; or (3) where the power output would exceed 10,000 watts ERP and the structure is located below the airport imaginary surfaces of § 77.27, § 77.28 or § 77.29 applicable to the airport concerned. With this software publicly available, all affected parties can apply the FAA-approved methodology as part of the Notice application process and submit proof that EMI to FAA facilities was considered. This will eliminate the burden faced by the FAA to develop and create these studies internally and will save extensive time in the review process.

Finally, the CVCC encourages the FAA to give consideration to allowing the antenna structure industry to self-certify on EMI issues. For example, the CVCC parties note that the FAA itself contracts EMI analysis to private contractors. Certainly, such a practice could be done by FAA-approved general contractors that deal directly with CVCC members. Assuming this process is eliminated from FAA internal efforts, CVCC members could deal with these FAA-approved contractors and ensure that EMI issues are not raised, without any interaction with the FAA. In this manner, an additional processing burden would be eliminated for the FAA and would allow a more expeditious approval process for affected CVCC members, without sacrificing public safety.

B. Conclusion

For the reasons detailed above, the CVCC respectfully submits that the existing Colo Void Clause places an unnecessary and substantial burden on tower owners, the wireless industry and the FAA, without a corresponding benefit in safety to the nation's airspace. Accordingly, the public interest will be served by the expeditious review of the 1990 *NPRM* and the adoption of valid rules to protect the nation's airspace. The CVCC is confident that EMI Notices can be handled in a more efficient manner, which would alleviate undue burdens on industry and the FAA, and would ensure that lawful FAA regulations and policies are followed in uniform fashion.

The CVCC requests a meeting with your office to discuss this matter in more detail. A coalition representative will contact your office to follow up on this correspondence and meeting request. In the interim please contact Roger Sherman of Sprint Corporation at (202) 585-1924 if you have any questions or would like additional information concerning this matter.

Respectfully submitted,

COLO VOID CLAUSE COALITION

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Verizon Wireless

/s/ William J. Hackett

William J. Hackett, Director – Regulatory
Compliance
Western Wireless Corporation

Attachments

The Honorable Marion C. Blakey, Administrator
October 1, 2002
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cc: The Honorable Jeffrey N. Shane, Associate Deputy Secretary of Transportation
The Honorable Read Van de Water, Ass't Secretary of Transportation for Aviation and
International Affairs, DOT
David L. Bennett, Director, FAA
Steven B. Zaidman, Director of Airway Facilities, FAA
Christopher Hart, Ass't Administrator for System Safety, FAA
David Leitch, Chief, Counsel, FAA
George Sakai, Office of Spectrum Policy & Management, FAA
Bryan Tramont, Senior Legal Advisor to Chairman Michael K. Powell, FCC
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Paul Margie, Legal Advisor to Commissioner Michael J. Copps, FCC
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